

COMMONWEALTH of VIRGINIA

DEPARTMENT OF ENVIRONMENTAL QUALITY

Permit No.:

VA0004669

Effective Date:

September 30, 2008

Expiration Date:

September 29, 2013

AUTHORIZATION TO DISCHARGE UNDER THE VIRGINIA POLLUTANT DISCHARGE ELIMINATION SYSTEM

AND

THE VIRGINIA STATE WATER CONTROL LAW

In compliance with the provisions of the Clean Water Act as amended and pursuant to the State Water Control Law and regulations adopted pursuant thereto, the following owner is authorized to discharge in accordance with the information submitted with the permit application, and with this permit cover page, Part I - Effluent Limitations and Monitoring Requirements, and Part II - Conditions Applicable To All VPDES Permits, as set forth herein.

Owners:

E.I. du Pont de Nemours & Co.

Facility Name:

DuPont - Spruance Plant

City:

N/A

County:

Chesterfield

Facility Location:

5401 Jefferson Davis Highway

The owner is authorized to discharge to the following receiving stream:

	Outfall 001	Outfalls 002 through 009
Name:	James River	Grindall Creek
Basin:	James River (Lower)	James River (Lower)
Subbasin:	N/A	N/A
Section:	1	1a
Class:	11	III
Special Standards:	bb	None

Deputy Regional Director, Piedmont Regional Office

Date

Effluent Limitations and Monitoring Requirements Ċ

- During the period beginning with the permit's effective date and lasting until the permit's expiration date, the permittee is authorized to discharge from outfall serial number 001 Combined Plant Discharge.
- Such discharges shall be limited and monitored at Outfall 001 by the permittee as specified below:

ä

			DISCHARGE LIMITATIONS	-ATIONS			MONITORING	MONITORING REQUIREMENTS
CHARACTERISTICS	MONTHLY	MONTHLY AVERAGE	WEEKLY	A I I A I I A I A	MA	MAXIMUM	>0	SAMDI E TVDE
	mg/L	kg/d	AVERAGE		mg/L	kg/d	LACCENCI	
Flow (MGD)	Z	N	NA	NA		NL	Continuous	Recorded
pH (standard units) ⁽¹⁾	AN	AN	NA	0.9		9.0	Continuous	Recorded
Total Residual Chlorine	0.038	AN	NA	AN	0.076	NA	1 / Day	Grab
Total Phosphorus	2.0	330	NA	NA	N	NL	1 / Week	24 HC
Ammonia-N	Z	N	NA	NA	٦	NL	1 / Month	24 HC
Temperature (°F)	AN	AN	NA	NA		104	Continuous	Recorded
CBOD ₅	z	N	NA	NA	N	NL	1 / Week	24 HC
Dissolved May 31	5.5 mg/L (minimum	5.5 mg/L (minimum)	6.0 mg/L (minimum)	5.0 mg/L	NA	NA	1/Day	Grab
(DO) (2) June 1 – Jan 31	5.5 r (mini)	5.5 mg/L (minimum)	4.0 mg/L (minimum)	3.2 mg/L	NA	NA	1/Day	Grab
Perfluorooctanoic acid (PFOA)	N	NF	NA	NA	N	N	1 / Month	Grab

"NA" means not applicable.

"NL" means no limitation is established. Monitoring and reporting, however, are required

"24 HC" means 24-hour composite.

See Part I.C.7 for pH excursion allowances. See Part I.C.8 for additional DO requirements.

53

There shall be no discharge of floating solids or visible foam in other than trace amounts. þ.

In addition to any Total Nitrogen or Total Phosphorus concentration limits (or monitoring requirements without associated limits) listed above, this facility has Total Nitrogen and Total Phosphorus calendar year load limits associated with this outfall included in the current Registration List under registration number VAN040079, enforceable under the General VPDES Watershed Permit Regulation for Total Nitrogen and Total Phosphorus Dischargers and Nutrient Trading in the Chesapeake Watershed in Virginia. ပ

Effluent Limitations and Monitoring Requirements

During the period beginning with the permit's effective date and lasting until the permit's expiration date, the permittee is authorized to discharge from outfall serial number 101 – Discharge from the Process Wastewater Treatment Facility. $^{\circ}$

Such discharges shall be limited and monitored at Outfall 101 by the permittee as specified below:

Summer: June 1 through October 31
Winter: November 1 through May 31

			DISCHARGE LIMITATIONS	TATIONS			MONITORING	MONITORING REQUIREMENTS
EFFLUENT CHARACTERISTICS	MONTHLY AVERAGE	AVERAGE	WEEKLY	241	MA	MAXIMUM	YONG	SAMBLETVER
	hg/L	kg/d	AVERAGE	MINIM	hg/L	kg/d	TAEGOENOT	SAIVIPLE LIFE
Flow (MGD)	Z		AN	ΝΑ		NL	Continuous	Recorded
CBODs	NL mg/L	290 ⁽¹⁾	NA	NA	NL	750 ⁽¹⁾	3 / Week	24 HC
Total Suspended Solids	NL mg/L	1100 ⁽¹⁾	NA	AN	NL	3680 ⁽²⁾	3 / Week	24 HC
Ammonia-N								
Summer	NL mg/L	267	NA	NA	N	535	3 / Week	24 HC
Winter	NL mg/L	342	NA	NA	N	685	3 / Week	24 HC
Total Nickel	N	4.3	AN	ΑΝ	N	7.0	1 / Quarter	24 HC
Total Zinc	Z	4.6	AN	AN	N	9.2	1 / Quarter	24 HC
Perfluorooctanoic acid (PFOA)	NL	NL	NA	NA	N	N	1 / Month	Grab
Hexamethylphosphoramide (HMPA)	N	NL	NA	NA	N	Ŋ	1/ Week	24 HC
Total Chromium	٦	35.50	NA	NA	NL	88.59	1 / Year	Grab
Total Cyanide	Z	13.4	NA	NA	N	38.38	1 / Year	Grab
Total Copper	Z	46.38	NA	NA	NL	108.1	1 / Year	Grab
Total Lead	٦	10.2	NA	NA	NL	22.1	1/Year	Grab
Trichloroethylene	N	0.67	NA	NA	N	1.7	1 / Year	Grab
Bis (2-ethylhexyl) phthalate	Z	3.29	NA	NA	NL	8.92	1 / Year	Grab
Ethylbenzene	Z	1.0	NA	NA	NL	3.45	1/Year	Grab
Vinyl Chloride	٦	3.33	NA	NA	N	8.57	1 / Year	Grab
Phenol	N	0.48	NA	NA	NL	0.83	1 / Year	Grab
Acrylonitrile	N	3.1	NA	NA	NL	7.74	1 / Year	Grab

L N H		٥	DISCHARGE LIMITATIONS	TATIONS			MONITORING	MONITORING REQUIREMENTS
CHARACTERISTICS	MONTHLY A	AVERAGE	WEEKLY	MINIMIIM	MA	MAXIMUM	FPECITENCY	SAMPLE TVDE
	hg/L	kg/d	AVERAGE		hg/L	kg/d	LACCENCI	SAIVIFLE
Methylene Chloride	Ŋ	1.3	NA	NA	N	2.8	1 / Year	Grab
Di-n-butyl phthalate	NL	0.86	NA	NA	NL	1.8	1 / Year	Grab
4,6-Dinitro-o-cresol	N	2.5	NA	NA	N	8.86	1 / Year	Grab
2-Nitrophenol	Ŋ	1.3	NA	AN	N	2.2	1 / Year	Grab
Benzene	N	1.2	NA	NA	NL	4.35	1 / Year	Grab
1,1,1-Trichloroethane	N	0.67	NA	NA	N	1.7	1 / Year	Grab
Tetrachloroethylene	N	0.70	NA	NA	N	1.8	1 / Year	Grab
Toluene	N	0.83	NA	NA	N	2.6	1/Year	Grab
Chloroform	NL	0.67	NA	NA	NL	1.5	1 / Year	Grab
Carbon Tetrachloride	N	0.58	NA	NA	NL	1.2	1 / Year	Grab
2,4-Dinitrotoluene	N	3.61	NA	NA	NL	9.12	1 / Year	Grab
2,6-Dinitrotoluene	Ŋ	8.16	NA	NA	NL	20.5	1/Year	Grab
1,1-Dichloroethylene	N	0.51	NA	NA	N	08.0	1/Year	Grab
1,2-Dichlorobenzene	NL	2.5	NA	NA	NL	5.21	1/Year	Grab
1,2-Dichloroethane	N	2.2	NA	NA	N	6.75	1 / Year	Grab
1,2-Dichloropropane	N	4.89	NA	NA	NL	7.36	1 / Year	Grab
1,2-trans-Dichloroethylene	N	0.67	NA	NA	NF	1.7	1 / Year	Grab
1,2,4-Trichlorobenzene	NL	2.2	NA	NA	N	4.48	1/Year	Grab
1,3-Dichlorobenzene	NL	66.0	NA	NA	N	1.4	1 / Year	Grab
1,3-Dichloropropylene	NL	0.93	NA	NA	NL	1.4	1 / Year	Grab
1,4-Dichlorobenzene	N	0.48	NA	NA	NL	06.0	1 / Year	Grab
2-Chlorophenol	NL	66.0	NA	AN	NL	3.1	1 / Year	Grab
2,4-Dichlorophenol	NL	1.2	NA	NA	N	3.58	1 / Year	Grab
2,4-Dimethylphenol	NL	0.58	NA	NA	NL	1.2	1 / Year	Grab
2,4-Dinitrophenol	NL	2.3	NA	NA	NL	3.93	1 / Year	Grab
3,4-Benzofluoranthene	NF	0.74	NA	AN	N	2.0	1 / Year	Grab
4-Nitrophenol	NL	2.3	NA	AN	N	3.97	1 / Year	Grab
Acenaphthene	N	0.70	AN	A A	N	1.9	1 / Year	Grab
Acenaphthylene	¥	0.70	AN	NA	¥	1.9	1 / Year	Grab

L Z L L L L L L			DISCHARGE LIMITATIONS	FATIONS			MONITORING	MONITORING REQUIREMENTS
CHARACTERISTICS	MONTHLY AVERAGE	AVERAGE	WEEKLY	MINIMALINA	MA	MAXIMUM	70101	I GWAS
	hg/L	kg/d	AVERAGE		hg/L	kg/d	T NEW OF INC.	SAMPLE ITPE
Anthracene	N	0.70	NA	ΝΑ	N	1.9	1 / Year	Grab
Benzo(a)anthracene	N	0.70	NA	NA	N	1.9	1 / Year	Grab
Benzo(a)pyrene	NL	0.74	NA	NA	N	2.0	1 / Year	Grab
Benzo(k)fluoranthene	NL	0.70	NA	NA	N	1.9	1 / Year	Grab
Chlorobenzene	N	0.48	NA	NA	N	06.0	1 / Year	Grab
Chloroethane	NL	3.33	NA	NA	N	8.57	1 / Year	Grab
Chrysene	NL	0.70	NA	NA	NL	1.9	1 / Year	Grab
Diethyl phthalate	N	2.6	NA	NA	N	6.49	1 / Year	Grab
Dimethyl phthalate	NL	0.61	NA	NA	N	1.5	1 / Year	Grab
Fluoranthene	NL	0.80	NA	NA	N	2.2	1 / Year	Grab
Fluorene	N	0.70	NA	NA	NL	1.9	1 / Year	Grab
Hexachlorobenzene	N	0.48	NA	NA	NL	06.0	1 / Year	Grab
Hexachlorobutadiene	NL	0.64	NA	NA	NL	1.6	1 / Year	Grab
Hexachloroethane	N	0.67	NA	NA	NL	1.7	1 / Year	Grab
Methyl Chloride	NL	2.8	NA	NA	NL	6.08	1 / Year	Grab
Naphthalene	N	0.70	NA	AN	N	1.9	1 / Year	Grab
Nitrobenzene	N	0.86	NA	AN	NL	2.2	1 / Year	Grab
Phenanthrene	N	0.70	NA	AN	N	1.9	1 / Year	Grab
Pyrene	N	0.80	NA	NA	NL	2.1	1 / Year	Grab
1,1,2-Trichloroethane	N	0.67	NA	ΑΝ	N	1.7	1 / Year	Grab
1,1-Dichloroethane	N	0.70	ΑN	NA	NL	1.9	1 / Year	Grab

(1) This limitation is expressed in two (2) significant figures. (2) This limitation is expressed in three (3) significant figures.

A. Effluent Limitations and Monitoring Requirements

During the period beginning with the permit's effective date and lasting until the permit's expiration date, the permittee is authorized to discharge from outfall serial number 102 – Wastewaters from the water treatment plant. ŝ

Such discharges shall be limited and monitored at Outfall 102 by the permittee as specified below:

MONITORING REQUIREMENTS		SAMPLE ITPE	Estimated	8 HC
MONITORING	YONAL		1 / Month	1 / Month
	MAXIMUM	kg/d	NL	NA
	MAX	mg/L kg/d		*09
ATIONS	PALIPALIAIPA		NA	NA
DISCHARGE LIMITATIONS	WEEKLY	AVERAGE	NA	NA
	AVERAGE	kg/d	L	NA
	MONTHLY	mg/L	N	30*
TNEU 1998	CHARACTERISTICS		Flow (MGD)	Total Suspended Solids

^{*} Limitation expressed in two significant figures.

Effluent Limitations and Monitoring Requirements

During the period beginning with the permit's effective date and lasting until the permit's expiration date, the permittee is authorized to discharge from outfall serial number 103 – Discharge from the Ground Water Treatment System. 4

Such discharges shall be limited and monitored at Outfall 103 by the permittee as specified below:

			Control of the Contro					
		Q	DISCHARGE LIMITATIONS	rations			MONITORING	MONITORING REQUIREMENTS
CHARACTERISTICS	MONTHLY	AVERAGE	WEEKLY	A I I I A I I A I	MAX	MAXIMUM	FPEOLIENCY	SAMPIETVDE
	mg/L	kg/d	AVERAGE		mg/L	kg/d	T NE COLINO	טאווון בר זון ב
Flow (MGD)	2	N	NA	AN		N	Continuous	Recorded
Hexamethylphosphoramide (HMPA)	¥	0.264	NA	AN	N	0.374	1 / Month	24 HC
CBODs	z	z	NA	AN	N	N	1 / Month	24 HC
Chloroform	Ŋ	0.097	NA	AN	N	0.283	1 / Month	Grab
Trichlorofluoromethane	Z	0.097	NA	AN	٦	0.283	1 / Month	Grab
Carbon Disulfide	Z	1.8	NA	ΑΝ	٦	4.4	1 / Month	Grab
Dissolved Zinc (µg/L)	Z	Ŋ	AN	AN	N	N	1 / Month	24 HC

Effluent Limitations and Monitoring Requirements Ä

ä

- During the period beginning with the permit's effective date and lasting until the permit's expiration date, the permittee is authorized to discharge from outfall serial numbers 002, 003, 004, 005, 006, 007, 008, and 009 - Storm Water Discharges 5
- No process water may be discharged from these outfalls. Outfalls 004, 005, 006, 007, 008, and 009 are substantially identical to outfall 002. Outfalls 002 and 003 shall be monitored as representative of outfalls 002 009. Such discharges shall be limited and monitored at each outfall by the permittee as specified below:

- 3															
	MONITORING REQUIREMENTS	SAMPLE TYPE	Estimated	Grab (2)	Grab (2)	Grab (2)	Grab (2)	Grab (2)	Grab (2)	Grab (2)	Grab (2)	Grab (2)	Grab (2)	Grab (2)	Grab (2)
	MONITORING	FREQUENCY	1 / Year	1 / Year	1 / Year	1 / Year	1 / Year	1 / Year	1 / Year	1 / Year	1/Year	1 / Year	1 / Year	1/Year	1/Year
		MAXIMUM	٦	Ŋ	J _N	Ŋ	J _N	N	٦N	N	٦N	JN	NL	N	٦
	MITATIONS	MINIMUM	NA	N	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
	DISCHARGE LIMITATIONS	WEEKLY AVERAGE	ΑN	NA	AN	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
		MONTHLY AVERAGE	٦	NA	N	N	N	N	N	N	N	NL	NL	NL	N
		CHARACTERISTICS	Flow (MG) (1)	pH (Standard Units)	Total Suspended Solids (mg/L)	COD (mg/L)	Ammonia-N (mg/L)	TKN (mg/L)	Chromium ⁽³⁾ (µg/L)	Total Petroleum Hydrocarbons (mg/L) ⁽⁴⁾	Nitrate/Nitrite (mg/L)	Lead ⁽³⁾ (µg/L)	Copper ⁽³⁾ (µg/L)	Nickel ⁽³⁾ (µg/L)	Zinc ⁽³⁾ (µg/L)

Estimate of the total volume of discharge during the storm event.

minutes, the sample may be taken during the first hour of discharge provided that the permittee explains why a grab sample during the All grab samples shall be taken within the first 30 minutes of discharge. If it is not practicable to take the sample during the first 30 first 30 minutes was impracticable. This information must be submitted on or with the Discharge Monitoring Report (DMR) 50

Total Recoverable and Dissolved forms of the metal. $\mathfrak{S}(4)$

SW 846 Method 8015C (2007) for gasoline and diesel range organics, or by EPA SW 846 Methods 8260B and 8270D. If the combination of Methods 8260B and 8270D is used, the lab must report the total of gasoline range organics, diesel range organics and TPH is the sum of individual gasoline range organics and diesel range organics or TPH-GRO and TPH-DRO to be measured by EPA polynuclear aromatic hydrocarbons.

The permittee shall provide the date and duration (in hours) of the storm event(s) sampled, rainfall measurements or estimates

(in inches) of the storm event that generated the sampled runoff, the duration between the storm even sampled and the end of the previous measurable (greater than 0.1 inch rainfall) storm event, and an estimate of the total volume (in gallons) of the discharge sampled.

- Also see Part I.D through G. of the permit. ပ
- There shall be no discharge of floating solids or visible foam in other than trace amounts from outfalls 002, 003, 004, 005, 006, 007, 008, or 009. ö

B. Whole Effluent Toxicity

- 1. Biological Monitoring
 - a. In accordance with the schedule in Part I.B.2 below, the permittee shall conduct annual acute and chronic toxicity tests for the duration of the permit. The permittee shall collect 24-hour flow-proportioned composite samples of final effluent from Outfall 001.

The acute tests to use are:

48 Hour Static Acute test using Ceriodaphnia dubia

48 Hour Static Acute test using Pimephales promelas

These acute tests shall be performed with a minimum of 5 dilutions, derived geometrically, for calculation of a valid LC_{50} . Express the results as TU_a (Acute Toxic Units) by dividing 100 by the calculated LC_{50} (100/ LC_{50}) for DMR reporting.

The chronic tests to use are:

Chronic 3-Brood Static Renewal Survival and Reproduction Test using *Ceriodaphnia dubia* Chronic 7-Day Static Renewal Survival and Growth Test using *Pimephales promelas*

These chronic tests shall be conducted in such a manner and at sufficient dilutions (minimum of five dilutions, derived geometrically) to determine the "No Observed Effect Concentration" (NOEC) for survival and reproduction or growth. Results which cannot be determined (i.e., a "less than" NOEC value) are not acceptable, and a retest will have to be performed. Express the test NOEC as TU_c (Chronic Toxic Units), by dividing 100/NOEC for DMR reporting. Report the LC_{50} at 48 hours and the IC_{25} with the NOECs in the test report.

The permittee may provide additional samples to address data variability; these data shall be reported and may be included in the evaluation of effluent toxicity. Test procedures and reporting shall be in accordance with the WET testing methods cited in 40 CFR 136.3.

- b. The test dilutions should be able to determine compliance with the following endpoints
 - (1) Acute LC₅₀ of 98% equivalent to a TU_a of 1.02.
 - (2) Chronic NOEC of 10% equivalent to a TU_c of 10.00.
- c. The test data will be evaluated for reasonable potential at the conclusion of the permit term. The data may be evaluated sooner if requested by the permittee or if toxicity has been noted. Should evaluation of the data indicate that a limit is needed, a WET limit and compliance schedule will be required and the toxicity tests in Part I.B.1.a may be discontinued.

2. Reporting Schedule

The permittee shall submit reports with the DMR and supply 2 copies of the toxicity test report for the tests specified in accordance with the following schedule:

<u>Period</u>	Compliance Date	Submittal Date
Annual 1	By 8/31/2009	By 09/10/2009
Annual 2	By 8/31/2010	By 09/10/2010
Annual 3	By 8/31/2011	By 09/10/2011
Annual 4	By 8/31/2012	By 09/10/2012
Annual 5	By 8/31/2013	By 09/10/2013

- C. Other Requirements or Special Conditions
 - 1. The permittee shall notify the Department as soon as they know or have reason to believe:
 - a. That any activity has occurred or will occur which would result in the discharge, on a routine or frequent basis, of any toxic pollutant which is not limited in this permit, if that discharge will exceed the highest of the following notification levels:
 - (1) One hundred micrograms per liter (100 µg/L);
 - (2) Two hundred micrograms per liter (200 μg/L); for acrolein and acrylonitrile; five hundred micrograms per liter (500 μg/L); for 2,4-dinitrophenol and for 2-methyl-4,6-dinitrophenol; and one milligram per liter (1mg/L); for antimony;
 - (3) Five (5) times the maximum concentration value reported for that pollutant in the permit application; or
 - (4) The level established by the Board.
 - b. That any activity has occurred or will occur which would result in any discharge, on a nonroutine or infrequent basis, of a toxic pollutant which is not limited in this permit, if that discharge will exceed the highest of the following notification levels:
 - (1) Five hundred micrograms per liter (500 µg/L);;
 - (2) One milligram per liter for antimony (1mg/L);;
 - (3) Ten (10) times the maximum concentration value reported for that pollutant in the permit application; or
 - (4) The level established by the Board.
 - 2. The permittee shall review the existing Operations and Maintenance (O & M) Manual and notify the DEQ Regional Office in writing within 90 days of the effective date of this permit whether it is still accurate and complete. If the O & M Manual is no longer accurate and complete, a revised O & M Manual shall be submitted for approval to the DEQ Regional Office within 90 days of the effective date of this permit or with the above required notification. The permittee will maintain an accurate, approved operation and maintenance manual for the treatment works. This manual shall detail the practices and procedures which will be followed to ensure compliance with the requirements of the permit. The permittee shall operate the treatment works in accordance with the approved O&M Manual. This manual shall include, but not necessarily be limited to, the following items, as appropriate:
 - a. Techniques to be employed in the collection, preservation, and analysis of effluent samples;
 - Discussion of Best Management Practices (BMPs) as outlined in the approved BMP Plan;
 - Treatment works design, treatment works operation, routine preventative maintenance of units within the treatment works, critical spare parts inventory and record keeping;
 - d. A plan for the management and/or disposal of waste solids and residues;
 - e. Procedures for handling, storing, and disposing of all wastes, fluids, and pollutants characterized in Part I.C.14 that will prevent these materials from reaching state waters;
 - f. Procedures for measuring and recording the duration and volume of treated wastewater discharged.

Any changes in the practices and procedures followed by the permittee shall be documented and submitted for DEQ Piedmont Regional Office staff approval within 90 days of the effective date of the changes. Upon approval of the submitted manual changes, the revised manual becomes an enforceable part of the permit. Noncompliance with the O & M Manual shall be deemed a violation of the permit.

- 3. Compliance Reporting
 - a. Maximum quantification levels (QL's) shall be as follows:

Effluent Characteristic	Quantification Level
Total Residual Chlorine	0.10 mg/l
Ammonia-N	0.20 mg/l
cBOD₅	5 mg/L

b. Reporting

Monthly Average – Compliance with the monthly average limitations and/or reporting requirements for the parameters listed in a. above shall be determined as follows: All concentration data below the QL listed in a. above shall be treated as zero. All concentration data equal to or above the QL listed in a. above shall be treated as it is reported. An arithmetic average shall be calculated using all reported data for the month, including the defined zeros. This arithmetic average shall be reported on the Discharge Monitoring Report (DMR) as calculated. If all data are below the QL, then the average shall be reported as "<QL". If reporting for quantity is required on the DMR and the calculated concentration is "<QL", then report "<QL" for the quantity. Otherwise use the concentration data and flow data for each sample day to determine the daily quantity and report the average of the calculated daily quantities.

Daily Maximum – Compliance with the daily maximum limitations and/or reporting requirements for the parameters listed in a. above shall be determined as follows: All concentration data below the QL listed in a. above shall be treated as zero. All concentration data equal to or above the QL listed in a. above shall be treated as reported. An arithmetic average shall be calculated using all reported data, including the defined zeros, collected within each day during the reporting month. The maximum value of these daily averages thus determined shall be reported on the DMR as the Daily Maximum. If all data are below the QL, then the maximum value of the daily averages shall be reported as "<QL". If reporting for quantity is required on the DMR and the calculated daily maximum is "<QL", then report "<QL" for the quantity. Otherwise use the daily average concentrations and corresponding daily flows to determine daily average quantities and report the maximum of the daily average quantities.

- c. Any single datum required shall be reported as "<QL" if it is less than the QL in section a. above. Otherwise the numerical value shall be reported.
- d. Significant Digits The permittee shall report at least the same number of significant digits as the permit limit for a given parameter. Regardless of the rounding convention used by the permittee (i.e., 5 always rounding up or to the nearest even number), the permittee shall use the convention consistently, and shall ensure that consulting laboratories employed by the permittee use the same convention.
- 4. This permit may be modified or, alternatively, revoked and reissued:
 - a. If any approved wasteload allocation procedure, pursuant to Section 303(d) of the Clean Water Act, imposes wasteload allocations, limits or conditions on the facility that are not consistent with the permit requirements;
 - b. To incorporate technology-based effluent concentration limitations for nutrients in conjunction with the installation of nutrient control technology, whether by new construction, expansion or upgrade, or
 - c. To incorporate alternative nutrient limitations and/or monitoring requirements, should:
 - (1) the State Water Control Board adopt new nutrient standards for the water body receiving the discharge, including the Chesapeake Bay or its tributaries, or
 - (2) a future water quality regulation or statute require new or alternative nutrient control.
- 5. If the permittee plans an expansion or upgrade to replace the existing treatment works, or if the facility is permanently closed, the permittee shall submit to the DEQ a closure plan for the existing treatment works. The plan shall address liquid and sludge removal, odor control measures, structure and pipe removal, steps to prevent unauthorized access, fill materials, and final grading and seeding. The plan should contain proposed dates for beginning and completion of the work. The plan must be approved by the DEQ prior to implementation. The permittee may continue discharging until the effluent no longer meets the permit limits or the permit expires, whichever comes first.
- 6. Should effluent monitoring indicate the need for any water quality-based limitations, this permit may be modified or alternatively revoked and reissued to incorporate appropriate limitations.

- 7. The pH shall be maintained between 6.0 and 9.0 standard units at Outfall 001 except as follows:
 - a. The total time that the pH values are outside the range of 6.0 to 9.0 standard units shall not exceed 7 hours and 26 minutes in any calendar month.
 - No individual excursion outside the range of 6.0 to 9.0 standard units shall exceed 60 minutes.
- 8. The dissolved oxygen limitations established in this permit are defined to be minima. That is, the dissolved oxygen concentrations must be at or above the effluent limitation in order to be in compliance with the limitation.
 - If more than one dissolved oxygen analysis is made during the 24-hour period that represents a monitoring day, only the minimum value from that day's sampling shall be used in calculating the monthly and weekly average minima.
- 9. Upon the effective date of the permittee's Watershed General Permit Total Phosphorus limitation, the monthly average Total Phosphorus limitations contained herein are waived. This permit shall receive annual average concentration limits to reflect technology installed by the permittee for the control of phosphorus, whether by new construction, expansion, or upgrade.
- 10. This facility shall submit a Concept Engineering Report (CER) for DEQ approval prior to installation of any nutrient removal wastewater treatment technology. Upon approval of a CER for the installation of nutrient removal technology, DEQ staff shall initiate modification, or alternately, revocation and reissuance, of this permit, to include annual concentration limits based on the technology proposed in the CER. The permittee shall inform the DEQ regional office within 14 days of completion of construction of any project for which a CER has been approved. Upon completion of construction in accordance with a CER that has been approved by the DEQ regional office, any nutrient removal facilities installed shall be operated to achieve design effluent levels.
- 11. The permittee shall implement the requirements of the approved Best Management Practice (BMP) Plan. The requirements of the BMP Plan are an enforceable part of this permit. The permittee shall amend the BMP Plan whenever there is a change in the facility or change in the operation of the facility which materially increases the potential for a discharge of significant amounts of pollutants. If the BMP Plan proves to be ineffective in achieving the general objective of preventing the release of significant amounts of pollutants to surface waters, the permit and/or the BMP Plan shall be subject to modification to incorporate revised BMP requirements.
- 12. The permittee shall employ or contract at least one Class I licensed wastewater works operator for this facility. The license shall be issued in accordance with Title 54.1 of the Code of Virginia and the regulations of the Board for Waterworks and Wastewater Works Operators. The permittee shall notify the Department in writing whenever he is not complying, or has grounds for anticipating he will not comply with this requirement. The notification shall include a statement of reasons and a prompt schedule for achieving compliance.
- 13. The "Performance Monitoring and Sampling Plan for the Onsite Groundwater Extraction System" shall be implemented by the permittee, shall be incorporated into this permit, and shall be an enforceable provision of this permit. Any changes to the plan must be submitted for approval to the DEQ-Piedmont Regional Office.
- 14. Any and all product, materials, industrial wastes, and/or other wastes resulting from the purchase, sale, mining, extraction, transportation, preparation, and/or storage of raw or intermediate materials, final product, by-product or wastes, shall be handled, disposed of, and/or stored in such a manner so as not to permit a discharge of such product, materials, industrial wastes, and/or other wastes to State waters, except as expressly authorized.

- 15. Disposal of the solids removed at the water treatment plant shall continue in accordance with the approval dated October 3, 1995 of the "Conceptual Engineering Report for Sludge Handling Facilities for the DuPont Spruance Water Treatment Plant."
- 16. The permittee shall monitor the effluent at outfall 001 for Strontium-90 and Tritium. The data shall be submitted to the DEQ Piedmont Regional Office within twelve months of the effective date of this permit. Monitoring and analysis shall be conducted in accordance with 40 CFR Part 136 or alternative EPA approved methods. It is the responsibility of the permittee to ensure that proper QA/QC protocols are followed during the sample gathering and analytical procedures. The DEQ will use these data for making specific permit decisions in the future. This permit may be modified or, alternatively, revoked and reissued to incorporate limits for any of the substances listed above.
- 17. If the facility permitted herein is issued a Notice of Violation for any of the parameters listed below, then the following effluent monitoring frequencies shall become effective upon written notice from DEQ and remain in effect until permit expiration.

Total Phosphor Ammonia	Outfall 001 us	1/Day 1/ Week
cBOD₅ TSS Ammonia Total Nickel Total Zinc 40 CFR 414.91	Outfall 101 parameters	1/Day 1/Day 1/Day 1/Month 1/Month 1/3 Months
cBOD₅ Chloroform Trichlorofluoron Carbon Disulfid HMPA Zinc		2/Month 2/Month 2/Month 2/Month 2/Month 2/Month

No other effluent limitations or monitoring requirements are affected by this special condition.

D. General Stormwater Special Conditions

Sample Type.

a. For all storm water monitoring required in Part I.A or other applicable sections of this permit, a minimum of one grab sample shall be taken. Unless otherwise specified, all such samples shall be collected from the discharge resulting from a storm event that is greater than 0.1 inch in magnitude and that occurs at least 72 hours from the previously measurable (greater than 0.1 inch rainfall) storm event. The required 72-hour storm event interval is waived where the preceding measurable storm event did not result in a measurable discharge from the facility. The required 72-hour storm event interval may also be waived where the permittee documents that less than a 72-hour interval is representative for local storm events during the season when sampling is being conducted. The grab sample shall be taken during the first 30 minutes of the discharge. If the collection of a grab sample during the first 30 minutes is impracticable, a grab sample can be taken during the first hour of the discharge, and the permittee shall submit with the monitoring report a description of why a grab sample during the first 30 minutes was

impracticable. If storm water discharges associated with industrial activity commingle with process or non-process water, then where practicable permittees must attempt to sample the storm water discharge before it mixes with the non-storm water discharge.

- b. Due to the nature of the effluent discharged at these outfalls (contaminated storm water associated with a regulated industrial activity), the following shall be required when obtaining samples required by Part I.A of this permit:
 - (1) At the time of sampling, the permittee shall ensure that the effects of tidal influences are kept to an absolute minimum. This can be achieved by:
 - (a) Sampling at low tide and/or
 - (b) Sampling at a representative point which has been demonstrated to be free of tidal influences
 - (2) In the event that sampling of an outfall is not possible due to the absence of effluent flow during a particular testing period, the permittee shall provide written notification to DEQ with the DMR for the month following the period in which samples were to be collected.

Recording of Results.

For each measurement or sample taken pursuant to the storm event monitoring requirements of this permit, the permittee shall record and report with the Discharge Monitoring Reports (DMRs) the following information:

- a. The date and duration (in hours) of the storm event(s) sampled;
- b. The rainfall measurements or estimates (in inches) of the storm event which generated the sampled discharge; and
- c. The duration between the storm event sampled and the end of the previous measurable (greater than 0.1 inch rainfall) storm event.

Documentation explaining a facility's inability to obtain a sample because there was no qualifying rain event, or measurable storm event, must be submitted with the stormwater DMR for that period.

3. Sampling Waiver.

When a permittee is unable to collect storm water samples required in Part I.A or other applicable sections of this permit within a specified sampling period due to adverse climatic conditions, the permittee shall collect a substitute sample from a separate qualifying event in the next period and submit these data along with the data for the routine sample in that period. Adverse weather conditions that may prohibit the collection of samples include weather conditions that create dangerous conditions for personnel (such as local flooding, high winds, hurricane, tornadoes, electrical storms, etc.) or otherwise make the collection of a sample impracticable (drought, extended frozen conditions, etc.).

4. Representative Discharges.

When a facility has two or more outfalls that, based on a consideration of industrial activity, significant materials, and management practices and activities within the area drained by the outfall, the permittee reasonably believes substantially identical effluents are discharged, the permittee may test the effluent of one of such outfalls and report that the quantitative data also apply to the substantially identical outfall(s) provided that: (1) the representative outfall determination has been approved by DEQ prior to data submittal; and, (2) the permittee includes in the storm water pollution prevention plan a description of the location of the outfalls and explains in detail why the outfalls are expected to discharge substantially identical effluents.

5. Quarterly Visual Examination of Storm Water Quality.

a. The permittee must perform and document a quarterly visual examination of a storm water discharge associated with industrial activity from each outfall, except discharges exempted below. The examination(s) must be made at least once in each of the following threemonth periods: January through March, April through June, July through September, and October through December. The visual examination must be made during daylight hours (e.g., normal working hours). If no storm event resulted in runoff from the facility during a monitoring quarter, the permittee is excused from visual monitoring for that quarter provided that documentation is included with the monitoring records indicating that no runoff occurred. The documentation must be signed and certified in accordance with Part II K of this permit.

- b. Visual examinations must be made of samples collected within the first 30 minutes (or as soon thereafter as practical, but not to exceed one hour) of when the runoff or snowmelt begins discharging from the facility. The examination must document observations of color, odor, clarity, floating solids, settled solids, suspended solids, foam, oil sheen, and other obvious indicators of storm water pollution. The examination must be conducted in a well-lit area. No analytical tests are required to be performed on the samples. All samples (except snowmelt samples) must be collected from the discharge resulting from a storm event that is greater than 0.1 inches in magnitude and that occurs at least 72 hours from the previously measurable (greater than 0.1 inch rainfall) storm event. The 72-hour storm interval is waived when the preceding measurable storm did not yield a measurable discharge, or if the permittee is able to document that less than a 72-hour interval is representative for local storm events during the sampling period. Where practicable, the same individual should carry out the collection and examination of discharges for the entire permit term. If no qualifying storm event resulted in runoff from the facility during a monitoring quarter, the permittee is excused from visual monitoring for that quarter provided that documentation is included with the monitoring records indicating that no qualifying storm event occurred that resulted in storm water runoff during that quarter. The documentation must be signed and certified in accordance with Part II K of this permit.
- c. The visual examination reports must be maintained on-site with the Storm Water Pollution Prevention Plan (SWPPP). The report must include the outfall location, the examination date and time, examination personnel, the nature of the discharge (i.e., runoff or snow melt), visual quality of the storm water discharge (including observations of color, odor, clarity, floating solids, settled solids, suspended solids, foam, oil sheen, and other obvious indicators of storm water pollution), and probable sources of any observed storm water contamination.
- d. If the facility has two or more outfalls that, based on a consideration of industrial activity, significant materials, and management practices and activities within the area drained by the outfall, the permittee reasonably believes discharge substantially identical effluents, the permittee may collect a sample of effluent of one of such outfalls and report that the examination data also applies to the substantially identical outfall(s) provided that the permittee includes in the storm water pollution prevention plan a description of the location of the outfalls and explains in detail why the outfalls are expected to discharge substantially identical effluents. In addition, for each outfall that the permittee believes is representative, an estimate of the size of the drainage area (in square feet) and an estimate of the runoff coefficient of the drainage area (i.e., low (under 40 percent), medium (40 to 65 percent), or high (above 65 percent)) shall be provided in the plan.
- e. When the permittee is unable to conduct the visual examination due to adverse climatic conditions, the permittee must document the reason for not performing the visual examination and retain this documentation onsite with the records of the visual examinations. Adverse weather conditions that may prohibit the collection of samples include weather conditions that create dangerous conditions for personnel (such as local flooding, high winds, hurricane, tornadoes, electrical storms, etc.) or otherwise make the collection of a sample impracticable (drought, extended frozen conditions, etc.).

6. Allowable Non-Storm Water Discharges.

- a. The following non-storm water discharges are authorized by this permit provided the non-storm water component of the discharge is in compliance with 6.b, below.
 - (1) Discharges from fire fighting activities;
 - (2) Fire hydrant flushings;
 - (3) Potable water including water line flushings;
 - (4) Uncontaminated air conditioning or compressor condensate;

- (5) Irrigation drainage;
- (6) Landscape watering provided all pesticides, herbicides, and fertilizer have been applied in accordance with manufacturer's instructions;
- (7) Pavement wash waters where no detergents are used and no spills or leaks of toxic or hazardous materials have occurred (unless all spilled material has been removed);
- (8) Routine external building wash down which does not use detergents;
- (9) Uncontaminated ground water or spring water;
- (10) Foundation or footing drains where flows are not contaminated with process materials such as solvents;
- (11)Incidental windblown mist from cooling towers that collects on rooftops or adjacent portions of the facility, but NOT intentional discharges from the cooling tower (e.g., "piped" cooling tower blowdown or drains).
- b. Except for flows from fire fighting activities, the Storm Water Pollution Prevention Plan must include:
 - (1) Identification of each allowable non-storm water source;
 - (2) The location where the non-storm water is likely to be discharged; and
 - (3) Descriptions of any BMPs that are being used for each source.
- c. If mist blown from cooling towers is included as one of the allowable non-storm water discharges from the facility, the permittee must specifically evaluate the potential for the discharges to be contaminated by chemicals used in the cooling tower, and must select and implement BMPs to control such discharges so that the levels of cooling tower chemicals in the discharges would not cause or contribute to a violation of an applicable water quality standard.

7. Releases of Hazardous Substances or Oil in Excess of Reportable Quantities.

The discharge of hazardous substances or oil in the storm water discharge(s) from the facility shall be prevented or minimized in accordance with the storm water pollution prevention plan for the facility. This permit does not authorize the discharge of hazardous substances or oil resulting from an on-site spill. This permit does not relieve the permittee of the reporting requirements of 40 CFR 110, 40 CFR 117 and 40 CFR 302 or § 62.1-44.34:19 of the Code of Virginia. Where a release containing a hazardous substance or oil in an amount equal to or in excess of a reportable quantity established under either 40 CFR 110, 40 CFR 117 or 40 CFR 302 occurs during a 24-hour period:

- a. The permittee is required to notify the Department in accordance with the requirements of Part II G as soon as he or she has knowledge of the discharge;
- b. Where a release enters a municipal separate storm sewer system (MS4), the permittee shall also notify the owner or the MS4; and
- c. The storm water pollution prevention plan required by this permit must be reviewed to identify measures to prevent the reoccurrence of such releases and to respond to such releases, and the plan must be modified where appropriate.

8. Additional Requirements for Salt Storage.

Storage piles of salt used for deicing or other commercial or industrial purposes must be enclosed or covered to prevent exposure to precipitation (except for exposure resulting from adding or removing materials from the pile). Piles do not need to be enclosed or covered where storm water from the pile is not discharged to state waters or the discharges from the piles are authorized under another permit.

E. Stormwater Pollution Prevention Plan

Refer to Part I. F for sector-specific storm water management requirements.

A storm water pollution prevention plan (SWPPP) for the facility was required to be developed and implemented under the previous permit. The existing storm water pollution prevention plan shall be reviewed and modified, as appropriate, to conform to the requirements of this section.

The plan shall identify potential sources of pollution that may reasonably be expected to affect the quality of storm water discharges associated with industrial activity from the facility. In addition, the plan shall describe and ensure the implementation of practices that are to be used to reduce the pollutants in storm water discharges associated with industrial activity at the facility and to assure compliance with the terms and conditions of this permit. Permittees must implement the provisions of the storm water pollution prevention plan as a condition of this permit.

The storm water pollution prevention plan requirements of this permit may be fulfilled by incorporating by reference other plans or documents such as an erosion and sediment control (ESC) plan, a spill prevention control and countermeasure (SPCC) plan developed for the facility under Section 311 of the Clean Water Act, or best management practices (BMP) programs otherwise required for the facility, provided that the incorporated plan meets or exceeds the plan requirements of Part I.E.2 (Contents of the Plan). If an ESC plan is being incorporated by reference, it shall have been approved by the locality in which the activity is to occur or by another appropriate plan approving authority authorized under the Virginia Erosion and Sediment Control Regulation, 4 VAC 50-30. All plans incorporated by reference into the storm water pollution prevention plan become enforceable under this permit.

1. <u>Deadlines for Plan Preparation and Compliance.</u>

- a. The permittee shall prepare and implement the plan as expeditiously as practicable, but not later than 270 days from the effective date of the permit.
- b. Measures That Require Construction. In cases where construction is necessary to implement measures required by the plan, the plan shall contain a schedule that provides compliance with the plan as expeditiously as practicable, but no later than 3 years after the effective date of this permit. Where a construction compliance schedule is included in the plan, the schedule shall include appropriate nonstructural and/or temporary controls to be implemented in the affected portion(s) of the facility prior to completion of the permanent control measure.

2. Contents of the Plan.

The contents of the SWPPP shall comply with the requirements listed below and those in Part I.F. The plan shall include, at a minimum, the following items:

- a. Pollution Prevention Team. The plan shall identify the staff individuals by name or title that comprise the facility's storm water pollution prevention team. The pollution prevention team is responsible for assisting the facility or plant manager in developing, implementing, maintaining, and revising the facility's SWPPP. Responsibilities of each staff individual on the team must be listed.
- b. Site Description. The plan shall include the following:
 - (1) Activities at the Facility. A description of the nature of the industrial activity(ies) at the facility.
 - (2) General Location Map. A general location map (e.g., USGS quadrangle or other map) with enough detail to identify the location of the facility and the receiving waters within one mile of the facility.
 - (3) Site Map. A site map identifying the following:
 - (a) Directions of storm water flow (e.g., use arrows to show which ways storm water will flow);
 - (b) Locations of all existing structural BMPs;
 - (c) Locations of all surface water bodies;
 - (d) Locations of potential pollutant sources identified under Part I.E.2.c and where significant materials are exposed to precipitation;
 - (e) Locations where major spills or leaks identified under Part I. E.2.d have occurred;
 - (f) Locations of the following activities where such activities are exposed to precipitation: fueling stations; vehicle and equipment maintenance and/or cleaning areas; loading/unloading areas; locations used for the treatment, storage or disposal of wastes; and liquid storage tanks;
 - (g) Locations of storm water outfalls and an approximate outline of the area draining to each outfall:

- (h) Location and description of non-storm water discharges;
- (i) Locations of the following activities where such activities are exposed to precipitation: processing and storage areas; access roads, rail cars and tracks; the location of transfer of substance in bulk; and machinery; and
- (j) Location and source of runoff from adjacent property containing significant quantities of pollutants of concern to the facility (the permittee may include an evaluation of how the quality of the storm water running onto the facility impacts the facility's storm water discharges).
- (4) Receiving Waters and Wetlands. The name of the nearest receiving water(s), including intermittent streams, dry sloughs, arroyos and the aerial extent and description of wetland sites that may receive discharges from the facility.
- c. Summary of Potential Pollutant Sources. The plan shall identify each separate area at the facility where industrial materials or activities are exposed to storm water. Industrial materials or activities include, but are not limited to: material handling equipment or activities, industrial machinery, raw materials, intermediate products, byproducts, final products, or waste products. Material handling activities include the storage, loading and unloading, transportation, or conveyance of any raw material, intermediate product, final product or waste product. For each separate area identified, the description must include:
 - (1) Activities in Area. A list of the activities (e.g., material storage, equipment fueling and cleaning, cutting steel beams); and
 - (2) Pollutants. A list of the associated pollutant(s) or pollutant parameter(s) (e.g., crankcase oil, iron, biochemical oxygen demand, pH, etc.) for each activity. The pollutant list must include all significant materials that have been handled, treated, stored or disposed in a manner to allow exposure to storm water between the time of three years before being covered under this permit and the present.
- d. Spills and Leaks. The SWPPP must clearly identify areas where potential spills and leaks that can contribute pollutants to storm water discharges can occur and their accompanying drainage points. For areas that are exposed to precipitation or that otherwise drain to a storm water conveyance at the facility to be covered under this permit, the plan must include a list of significant spills and leaks of toxic or hazardous pollutants that occurred during the three-year period prior to the date of the submission of an EPA Form 2F. The list must be updated if significant spills or leaks occur in exposed areas of the facility during the term of the permit. Significant spills and leaks include releases of oil or hazardous substances in excess of reportable quantities, and may also include releases of oil or hazardous substances that are not in excess of reporting requirements.
- e. Sampling Data. The plan must include a summary of existing discharge sampling data taken at the facility, and must also include a summary of sampling data collected during the term of this permit.
- f. Storm Water Controls. The SWPPP shall include a description of storm water management controls appropriate for the facility. The description of controls shall address the following minimum components:
 - (1) Description of Existing and Planned BMPs. The plan shall describe the type and location of existing nonstructural and structural best management practices (BMPs) selected for each of the areas where industrial materials or activities are exposed to storm water. All the areas identified in Part I.E.2.c (Summary of Potential Pollutant Sources) should have a BMP(s) identified for the area's discharges. For areas where BMPs are not currently in place, include a description of appropriate BMPs that will be used to control pollutants in storm water discharges. Selection of BMPs should take into consideration:
 - (a) The quantity and nature of the pollutants, and their potential to impact the water quality of receiving waters;
 - (b) Opportunities to combine the dual purposes of water quality protection and local flood control benefits, including physical impacts of high flows on streams (e.g., bank erosion, impairment of aquatic habitat, etc.);
 - (c) Opportunities to offset the impact of impervious areas of the facility on ground water recharge and base flows in local streams, taking into account the potential

for ground water contamination.

- (2) BMP Types to be Considered. The permittee must consider the following types of structural, nonstructural and other BMPs for implementation at the facility. The SWPPP shall describe how each BMP is, or will be, implemented. If this requirement was fulfilled with the area-specific BMPs identified under Part I.E.2.f(1), then the previous description is sufficient. However, many of the following BMPs may be more generalized or non-site-specific and therefore not previously considered. If the permittee determines that any of these BMPs are not appropriate for the facility, an explanation of why they are not appropriate shall be included in the plan. The BMP examples listed below are not intended to be an exclusive list of BMPs that may be used. The permittee is encouraged to keep abreast of new BMPs or new applications of existing BMPs to find the most cost effective means of permit compliance for the facility. If BMPs are being used or planned at the facility that are not listed here (e.g., replacing a chemical with a less toxic alternative, adopting a new or innovative BMP, etc.), descriptions of them shall be included in this section of the SWPPP.
 - (a) Nonstructural BMPs.
 - (i) Good Housekeeping. The permittee must keep all exposed areas of the facility in a clean, orderly manner where such exposed areas could contribute pollutants to storm water discharges. Common problem areas include around trash containers, storage areas and loading docks. Measures must also include a schedule for regular pickup and disposal of garbage and waste materials; routine inspections for leaks and conditions of drums, tanks and containers.
 - (ii) Minimizing Exposure. Where practicable, industrial materials and activities should be protected by a storm-resistant shelter to prevent exposure to rain, snow, snowmelt, or runoff. Note: Eliminating exposure at all industrial areas may make the facility eligible for the "Conditional Exclusion for No Exposure" provision of 9 VAC 25-31-120 F, thereby eliminating the need to have a permit.
 - (iii) Preventive Maintenance. The permittee must have a preventive maintenance program that includes timely inspection and maintenance of storm water management devices (e.g., cleaning oil/water separators, catch basins), as well as inspection, testing, maintenance and repairing of facility equipment and systems to avoid breakdowns or failures that could result in discharges of pollutants to surface waters.
 - (iv) Spill Prevention and Response Procedures. The plan must describe the procedures that will be followed for cleaning up spills or leaks. The procedures and necessary spill response equipment must be made available to those employees who may cause or detect a spill or leak. Where appropriate, the plan must include an explanation of existing or planned material handling procedures, storage requirements, secondary containment, and equipment (e.g., diversion valves), that are intended to minimize spills or leaks at the facility. Measures for cleaning up hazardous material spills or leaks must be consistent with applicable RCRA regulations at 40 CFR Part 264 and 40 CFR Part 265.
 - (v) Routine Facility Inspections. Facility personnel who are familiar with the industrial activity, the BMPs and the storm water pollution prevention plan shall be identified to inspect all areas of the facility where industrial materials or activities are exposed to storm water. These inspections are in addition to, or as part of, the comprehensive site evaluation required under Part I.E.4, and must include an evaluation of the existing storm water BMPs. The inspection frequency shall be specified in the plan based upon a consideration of the level of industrial activity at the facility, but shall be a minimum of quarterly unless more frequent intervals are specified elsewhere in the permit. Any deficiencies in the implementation of the SWPPP that are found must be corrected as soon as practicable, but not later than within 14 days of the inspection, unless permission for a later date is granted in writing by the director. The results of the inspections must be documented in the SWPPP, along with any corrective

- actions that were taken in response to any deficiencies or opportunities for improvement that were identified.
- (vi) Employee Training. The SWPPP must describe the storm water employee training program for the facility. The description should include the topics to be covered, such as spill response, good housekeeping, and material management practices, and must identify periodic dates for such training (e.g., every six months during the months of July and January). Employee training must be provided for all employees who work in areas where industrial materials or activities are exposed to storm water, and for employees who are responsible for implementing activities identified in the SWPPP (e.g., inspectors, maintenance people). The training should inform employees of the components and goals of the SWPPP.

(b) Structural BMPs.

- (i) Sediment and Erosion Control. The plan shall identify areas at the facility that, due to topography, land disturbance (e.g., construction), or other factors, have a potential for significant soil erosion. The plan must identify structural, vegetative, and/or stabilization BMPs that will be implemented to limit erosion.
- (ii) Management of Runoff. The plan shall describe the traditional storm water management practices (permanent structural BMPs other than those that control the generation or source(s) of pollutants) that currently exist or that are planned for the facility. These types of BMPs are typically used to divert, infiltrate, reuse, or otherwise reduce pollutants in storm water discharges from the site. The plan shall provide that all measures that the permittee determines to be reasonable and appropriate, or are required by a state or local authority shall be implemented and maintained. Factors for the permittee to consider when selecting appropriate BMPs should include:
 - (A) The industrial materials and activities that are exposed to storm water, and the associated pollutant potential of those materials and activities; and
 - (B) The beneficial and potential detrimental effects on surface water quality, ground water quality, receiving water base flow (dry weather stream flow), and physical integrity of receiving waters.
 - Structural measures should be placed on upland soils, avoiding wetlands and floodplains, if possible. Structural BMPs may require a separate permit under § 404 of the CWA before installation begins.
- (iii) Example BMPs. BMPs that could be used include but are not limited to: storm water detention structures (including wet ponds); storm water retention structures; flow attenuation by use of open vegetated swales and natural depressions; infiltration of runoff on-site; and sequential systems (which combine several practices).
- (iv) Other Controls. Off-site vehicle tracking of raw, final, or waste materials or sediments, and the generation of dust must be minimized. Tracking or blowing of raw, final, or waste materials from areas of no exposure to exposed areas must be minimized. Velocity dissipation devices (or equivalent measures) must be placed at discharge locations and along the length of any outfall channel if they are necessary to provide a non-erosive flow velocity from the structure to a water course.

3. Maintenance.

All BMPs identified in the SWPPP must be maintained in effective operating condition. If site inspections required by Part I.E.4 identify BMPs that are not operating effectively, maintenance must be performed before the next anticipated storm event, or as necessary to maintain the continued effectiveness of storm water controls. If maintenance prior to the next anticipated storm event is impracticable, maintenance must be scheduled and accomplished as soon as practicable. In the case of nonstructural BMPs, the effectiveness of the BMP must be maintained by appropriate means (e.g., spill response supplies available and personnel trained, etc.).

4. Comprehensive Site Compliance Evaluation.

The permittee shall conduct facility inspections (site compliance evaluations) at least once a year. The inspections must be done by qualified personnel who may be either facility employees or outside constituents hired by the facility. The inspectors must be familiar with the industrial activity, the BMPs and the SWPPP, and must possess the skills to assess conditions at the facility that could impact storm water quality, and to assess the effectiveness of the BMPs that have been chosen to control the quality of the storm water discharges. If more frequent inspections are conducted, the SWPPP must specify the frequency of inspections.

- a. Scope of the Compliance Evaluation. Inspections must include all areas where industrial materials or activities are exposed to storm water, as identified in Part I.E.2.c, and areas where spills and leaks have occurred within the past three years. Inspectors should look for:
 - (1) Industrial materials, residue or trash on the ground that could contaminate or be washed away in storm water;
 - (2) Leaks or spills from industrial equipment, drums, barrels, tanks or similar containers;
 - (3) Off-site tracking of industrial materials or sediment where vehicles enter or exit the site;
 - (4) Tracking or blowing of raw, final, or waste materials from areas of no exposure to exposed areas; and
 - (5) Evidence of, or the potential for, pollutants entering the drainage system.

Results of both visual and any analytical monitoring done during the year must be taken into consideration during the evaluation. Storm water BMPs identified in the SWPPP must be observed to ensure that they are operating correctly. Where discharge locations or points are accessible, they must be inspected to see whether BMPs are effective in preventing significant impacts to receiving waters. Where discharge locations are inaccessible, nearby downstream locations must be inspected if possible.

- b. Based on the results of the inspection, the SWPPP shall be modified as necessary (e.g., show additional controls on the map required by Part I.E.2.b(3); revise the description of controls required by Part I.E.2.f to include additional or modified BMPs designed to correct problems identified). Revisions to the SWPPP shall be completed within two weeks following the inspection, unless permission for a later date is granted in writing by the director. If existing BMPs need to be modified or if additional BMPs are necessary, implementation must be completed before the next anticipated storm event, if practicable, but not more than 12 weeks after completion of the comprehensive site evaluation, unless permission for a later date is granted in writing by the director;
- c. Compliance Evaluation Report. A report summarizing the scope of the inspection, name(s) of personnel making the inspection, the date(s) of the inspection, and major observations relating to the implementation of the SWPPP, and actions taken in accordance with Part I.E.4.b shall be made and retained as part of the SWPPP for at least three years from the date of the inspection. Major observations should include: the location(s) of discharges of pollutants from the site; location(s) of BMPs that need to be maintained; location(s) of BMPs that failed to operate as designed or proved inadequate for a particular location; and location(s) where additional BMPs are needed that did not exist at the time of inspection. The report shall identify any incidents of noncompliance. Where a report does not identify any incidents of noncompliance, the report shall contain a certification that the facility is in compliance with the SWPPP and this permit. The report shall be signed in accordance with Part II K; and
- d. Where compliance evaluation schedules overlap with routine inspections required under Part I.E.2.f(2)(a)(v), the annual compliance evaluation may be used as one of the routine inspections.

5. Signature and Plan Review.

- a. Signature/Location. The plan shall be signed in accordance with Part II K, and retained on-site at the facility covered by this permit in accordance with Part II B.2.
- b. Availability. The permittee shall make the SWPPP, annual site compliance inspection report, and other information available to the department upon request.

c. Required Modifications. The director may notify the permittee at any time that the plan does not meet one or more of the minimum requirements of this permit. The notification shall identify those provisions of the permit that are not being met, as well as the required modifications. The permittee shall make the required changes to the SWPPP within 60 days of receipt of such notification, unless permission for a later date is granted in writing by the director, and shall submit a written certification to the director that the requested changes have been made.

6. Maintaining an Updated SWPPP.

The permittee shall amend the SWPPP whenever:

- a. There is a change in design, construction, operation, or maintenance at the facility that has a significant effect on the discharge, or the potential for the discharge, of pollutants from the facility;
- b. During inspections, monitoring, or investigations by facility personnel or by local, state, or federal officials it is determined that the SWPPP is ineffective in eliminating or significantly minimizing pollutants from sources identified under Part I.E.2.c, or is otherwise not achieving the general objectives of controlling pollutants in discharges from the facility.

7. Special Pollution Prevention Plan Requirements.

- a. Additional Requirements for Storm Water Discharges Associated With Industrial Activity That Discharge Into or Through Municipal Separate Storm Sewer Systems.
 - (1) In addition to the applicable requirements of this permit, facilities covered by this permit must comply with applicable requirements in municipal storm water management programs developed under NPDES permits issued for the discharge of the municipal separate storm sewer system that receives the facility's discharge, provided the permittee has been notified of such conditions.
 - (2) Permittees that discharge storm water associated with industrial activity through a municipal separate storm sewer system shall make plans available to the municipal operator of the system upon request.
- b. Additional Requirements for Storm Water Discharges Associated With Industrial Activity From Facilities Subject to EPCRA § 313 Reporting Requirements.

Any potential pollutant sources for which the facility has reporting requirements under EPCRA § 313 must be identified in the SWPPP in Part I.E.2.c (Summary of Potential Pollutant Sources). Note: this additional requirement is only applicable if the facility is subject to reporting requirements under EPCRA § 313.

F. Sector-Specific Stormwater Pollution Prevention Plan Requirements

In addition to the requirements of Part I.E, the SWPPP shall include, at a minimum, the following items:

1. Site Description.

- a. Site Map. The site map shall identify where any of the following may be exposed to precipitation/surface runoff: processing and storage areas; access roads, rail cars and tracks; areas where substances are transferred in bulk; and operating machinery.
- b. Summary of Potential Pollutant Sources. A description of the following sources and activities that have potential pollutants associated with them: loading, unloading and transfer of chemicals; outdoor storage of salt, pallets, coal, drums, containers, fuels, fueling stations; vehicle and equipment maintenance/cleaning areas; areas where the treatment, storage or disposal (on-site or off-site) of waste/wastewater occur; storage tanks and other containers; processing and storage areas; access roads, rail cars and tracks; areas where the transfer of substances in bulk occurs; and areas where machinery operates.

2. Storm Water Controls.

Nonstructural BMPs. Good Housekeeping. At a minimum, the SWPPP shall:

- a. Include a schedule for regular pickup and disposal of garbage and waste materials, or a description of other appropriate measures used to reduce the potential for the discharge of storm water that has come into contact with garbage or waste materials;
- b. Include routine inspections of the condition of drums, tanks and containers for potential leaks.

G. Stormwater Management Evaluation

The Storm Water Pollution Prevention Plan, SWPPP, which is to be developed and maintained in accordance with Part I.E and Part I.F of this permit, shall have a goal of reducing pollutants discharged at all the regulated storm water outfalls.

1. Pollutant Specific Screening.

One goal of the SWPPP shall place emphasis on reducing, to the maximum extent practicable, the following pollutants in the outfalls noted below.

OUTFALL NO.

POLLUTANTS

002 and 003

Total Recoverable Zinc and Total Recoverable Copper

2. Toxicity Screening.

- a. The permittee shall conduct annual acute toxicity tests on the outfalls noted in G.1 above using grab samples of final effluent. These tests shall be 48-hour static tests using *Ceriodaphnia dubia* conducted in such a manner and at sufficient dilutions for calculation of a valid LC₅₀. The tests shall be conducted on an annual basis with one copy of all results and all supporting information submitted with the annual report due by July 10th of each year. Technical assistance in developing the procedures for these tests will be provided by the Department of Environmental Quality (DEQ), if requested by the permittee. If any of the biological tests are invalidated, an additional test shall be conducted within thirty (30) days of notification. If there is no discharge during this 30-day period, a sample must be taken during the first qualifying discharge.
- b. The permittee shall submit the following information with the results of the toxicity tests.
 - (1) The actual or estimated effluent flow at the time of the sampling.
 - (2) An estimate of the total volume of storm water discharged through each outfall during the discharge event.
 - (3) The time at which the discharge event began, the time at which the effluent was sampled, and the duration of the discharge event.
- 3. The effectiveness of the SWPPP will be evaluated via the required monitoring for all parameters listed in Part I.A of this permit for the regulated storm water outfalls and the toxicity screening required by this special condition. Those results will justify the need to reexamine the SWPPP and any best management practices (BMPs) being utilized for the affected outfalls. In addition, the permittee shall amend the SWPPP whenever there is a change in the facility or its operation which materially increases the potential for activities to result in a discharge of significant amounts of pollutants.
- 4. By July 10 of each year, the permittee shall submit to the DEQ Regional Office an Annual Report which includes the pollutant-specific and biological monitoring data from the outfalls included in this condition along with a summary of any steps taken to modify either the SWPPP or any BMPs based on the monitoring data. The first report is due on July 10, 2009.

Permit No. VA0004669 Part II Page 1 of 8

CONDITIONS APPLICABLE TO ALL VPDES PERMITS

A. Monitoring

- Samples and measurements taken as required by this permit shall be representative of the monitored activity.
- 2. Monitoring shall be conducted according to procedures approved under Title 40 Code of Federal Regulations Part 136 or alternative methods approved by the U.S. Environmental Protection Agency, unless other procedures have been specified in this permit.
- 3. The permittee shall periodically calibrate and perform maintenance procedures on all monitoring and analytical instrumentation at intervals that will insure accuracy of measurements.

B. Records

- 1. Records of monitoring information shall include:
 - a. The date, exact place, and time of sampling or measurements;
 - b. The individual(s) who performed the sampling or measurements;
 - c. The date(s) and time(s) analyses were performed;
 - d. The individual(s) who performed the analyses;
 - e. The analytical techniques or methods used; and
 - f. The results of such analyses.
- 2. Except for records of monitoring information required by this permit related to the permittee's sewage sludge use and disposal activities, which shall be retained for a period of at least five years, the permittee shall retain records of all monitoring information, including all calibration and maintenance records and all original strip chart recordings for continuous monitoring instrumentation, copies of all reports required by this permit, and records of all data used to complete the application for this permit, for a period of at least 3 years from the date of the sample, measurement, report or application. This period of retention shall be extended automatically during the course of any unresolved litigation regarding the regulated activity or regarding control standards applicable to the permittee, or as requested by the Board.

C. Reporting Monitoring Results

 The permittee shall submit the results of the monitoring required by this permit not later than the 10th day of the month after monitoring takes place, unless another reporting schedule is specified elsewhere in this permit. Monitoring results shall be submitted to:

DEQ - Piedmont Regional Office 4949-A Cox Road Glen Allen, VA 23060

- 2. Monitoring results shall be reported on a Discharge Monitoring Report (DMR) or on forms provided, approved, or specified by the Department.
- 3. If the permittee monitors any pollutant specifically addressed by this permit more frequently than required by this permit using test procedures approved under Title 40 of the Code of Federal Regulations Part 136 or using other test procedures approved by the U.S. Environmental Protection Agency or using procedures specified in this permit, the results of this monitoring shall be included in the calculation and reporting of the data submitted in the DMR or reporting form specified by the Department.
- 4. Calculations for all limits which require averaging of measurements shall utilize an arithmetic mean unless otherwise specified in this permit.

Permit No. VA0004669 Part II Page 2 of 8

D. Duty to Provide Information

The permittee shall furnish to the Department, within a reasonable time, any information which the Board may request to determine whether cause exists for modifying, revoking and reissuing, or terminating this permit or to determine compliance with this permit. The Board may require the permittee to furnish, upon request, such plans, specifications, and other pertinent information as may be necessary to determine the effect of the wastes from his discharge on the quality of state waters, or such other information as may be necessary to accomplish the purposes of the State Water Control Law. The permittee shall also furnish to the Department upon request, copies of records required to be kept by this permit.

E. Compliance Schedule Reports

Reports of compliance or noncompliance with, or any progress reports on, interim and final requirements contained in any compliance schedule of this permit shall be submitted no later than 14 days following each schedule date.

F. Unauthorized Discharges

Except in compliance with this permit, or another permit issued by the Board, it shall be unlawful for any person to:

- 1. Discharge into state waters sewage, industrial wastes, other wastes, or any noxious or deleterious substances; or
- 2. Otherwise alter the physical, chemical or biological properties of such state waters and make them detrimental to the public health, or to animal or aquatic life, or to the use of such waters for domestic or industrial consumption, or for recreation, or for other uses.

G. Reports of Unauthorized Discharges.

Any permittee who discharges or causes or allows a discharge of sewage, industrial waste, other wastes or any noxious or deleterious substance into or upon state waters in violation of Part II F 1; or who discharges or causes or allows a discharge that may reasonably be expected to enter state waters in violation of Part II F 1, shall notify the Department of the discharge immediately upon discovery of the discharge, but in no case later than 24 hours after said discovery. A written report of the unauthorized discharge shall be submitted to the Department, within five days of discovery of the discharge. The written report shall contain:

- 1. A description of the nature and location of the discharge;
- 2. The cause of the discharge;
- 3. The date on which the discharge occurred;
- 4. The length of time that the discharge continued;
- 5. The volume of the discharge;
- 6. If the discharge is continuing, how long it is expected to continue;
- 7. If the discharge is continuing, what the expected total volume of the discharge will be; and
- 8. Any steps planned or taken to reduce, eliminate and prevent a recurrence of the present discharge or any future discharges not authorized by this permit. Discharges reportable to the Department under the immediate reporting requirements of other regulations are exempted from this requirement.

H. Reports of Unusual or Extraordinary Discharges

If any unusual or extraordinary discharge including a bypass or upset should occur from a treatment works and the discharge enters or could be expected to enter state waters, the

Permit No. VA0004669 Part II

Page 3 of 8

permittee shall promptly notify, in no case later than 24 hours, the Department by telephone after the discovery of the discharge. This notification shall provide all available details of the incident, including any adverse affects on aquatic life and the known number of fish killed. The permittee shall reduce the report to writing and shall submit it to the Department within five days of discovery of the discharge in accordance with Part II I 2. Unusual and extraordinary discharges include but are not limited to any discharge resulting from:

- 1. Unusual spillage of materials resulting directly or indirectly from processing operations;
- 2. Breakdown of processing or accessory equipment;
- 3. Failure or taking out of service some or all of the treatment works; and
- Flooding or other acts of nature.

I. Reports of Noncompliance

The permittee shall report any noncompliance which may adversely affect state waters or may endanger public health.

- 1. An oral report shall be provided within 24 hours from the time the permittee becomes aware of the circumstances. The following shall be included as information which shall be reported within 24 hours under this paragraph:
 - a. Any unanticipated bypass; and
 - b. Any upset which causes a discharge to surface waters.
- 2. A written report shall be submitted within 5 days and shall contain:
 - a. A description of the noncompliance and its cause:
 - b. The period of noncompliance, including exact dates and times, and if the noncompliance has not been corrected, the anticipated time it is expected to continue; and
 - Steps taken or planned to reduce, eliminate, and prevent reoccurrence of the noncompliance.

The Board may waive the written report on a case-by-case basis for reports of noncompliance under Part II I. if the oral report has been received within 24 hours and no adverse impact on state waters has been reported.

3. The permittee shall report all instances of noncompliance not reported under Parts II I.1 or 2, in writing, at the time the next monitoring reports are submitted. The reports shall contain the information listed in Part II I.2.

NOTE: The immediate (within 24 hours) reports required in Parts II G, H and I may be made to the Department's Regional Office at (804) 527-5020 or fax (804) 527-5106. For reports outside normal working hours, leave a message and this shall fulfill the immediate reporting requirement. For emergencies, the Virginia Department of Emergency Services maintains a 24 hour telephone service at 1-800-468-8892.

J. Notice of Planned Changes

- 1. The permittee shall give notice to the Department as soon as possible of any planned physical alterations or additions to the permitted facility. Notice is required only when:
 - a. The permittee plans alteration or addition to any building, structure, facility, or installation from which there is or may be a discharge of pollutants, the construction of which commenced:
 - (1) After promulgation of standards of performance under Section 306 of Clean Water Act which are applicable to such source; or
 - (2) After proposal of standards of performance in accordance with Section

Permit No. VA0004669 Part II Page 4 of 8

306 of Clean Water Act which are applicable to such source, but only if the standards are promulgated in accordance with Section 306 within 120 days of their proposal;

- b. The alteration or addition could significantly change the nature or increase the quantity of pollutants discharged. This notification applies to pollutants which are subject neither to effluent limitations nor to notification requirements specified elsewhere in this permit; or
- c. The alteration or addition results in a significant change in the permittee's sludge use or disposal practices, and such alteration, addition, or change may justify the application of permit conditions that are different from or absent in the existing permit, including notification of additional use or disposal sites not reported during the permit application process or not reported pursuant to an approved land application plan.
- 2. The permittee shall give advance notice to the Department of any planned changes in the permitted facility or activity which may result in noncompliance with permit requirements.

K. Signatory Requirements

- 1. Applications. All permit applications shall be signed as follows:
 - a. For a corporation: by a responsible corporate officer. For the purpose of this section, a responsible corporate officer means: (i) A president, secretary, treasurer, or vice-president of the corporation in charge of a principal business function, or any other person who performs similar policy- or decision-making functions for the corporation, or (ii) the manager of one or more manufacturing, production, or operating facilities, provided the manager is authorized to make management decisions which govern the operation of the regulated facility including having the explicit or implicit duty of making major capital investment recommendations, and initiating and directing other comprehensive measures to assure long term environmental compliance with environmental laws and regulation; the manager can ensure that the necessary systems are established or actions taken to gather complete and accurate information for permit application requirements; and where authority to sign documents has been assigned or delegated to the manager in accordance with corporate procedures;
 - b. For a partnership or sole proprietorship: by a general partner or the proprietor, respectively; or
 - c. For a municipality, state, federal, or other public agency: By either a principal executive officer or ranking elected official. For purposes of this section, a principal executive officer of a public agency includes: (i) The chief executive officer of the agency, or (ii) a senior executive officer having responsibility for the overall operations of a principal geographic unit of the agency.
- Reports, etc. All reports required by permits, and other information requested by the Board shall be signed by a person described in Part II K 1, or by a duly authorized representative of that person. A person is a duly authorized representative only if:
 - a. The authorization is made in writing by a person described in Part II K 1;
 - b. The authorization specifies either an individual or a position having responsibility for the overall operation of the regulated facility or activity such as the position of plant manager, operator of a well or a well field, superintendent, position of equivalent responsibility, or an individual or position having overall responsibility for environmental matters for the company. (A duly authorized representative

Permit No. VA0004669 Part II Page 5 of 8

may thus be either a named individual or any individual occupying a named position.); and

- c. The written authorization is submitted to the Department.
- 3. Changes to authorization. If an authorization under Part II K 2 is no longer accurate because a different individual or position has responsibility for the overall operation of the facility, a new authorization satisfying the requirements of Part II K 2 shall be submitted to the Department prior to or together with any reports, or information to be signed by an authorized representative.
- 4. Certification. Any person signing a document under Parts II K 1 or 2 shall make the following certification:

"I certify under penalty of law that this document and all attachments were prepared under my direction or supervision in accordance with a system designed to assure that qualified personnel properly gather and evaluate the information submitted. Based on my inquiry of the person or persons who manage the system, or those persons directly responsible for gathering the information, the information submitted is, to the best of my knowledge and belief, true, accurate, and complete. I am aware that there are significant penalties for submitting false information, including the possibility of fine and imprisonment for knowing violations."

L. Duty to Comply

The permittee shall comply with all conditions of this permit. Any permit noncompliance constitutes a violation of the State Water Control Law and the Clean Water Act, except that noncompliance with certain provisions of this permit may constitute a violation of the State Water Control Law but not the Clean Water Act. Permit noncompliance is grounds for enforcement action; for permit termination, revocation and reissuance, or modification; or denial of a permit renewal application.

The permittee shall comply with effluent standards or prohibitions established under Section 307(a) of the Clean Water Act for toxic pollutants and with standards for sewage sludge use or disposal established under Section 405(d) of the Clean Water Act within the time provided in the regulations that establish these standards or prohibitions or standards for sewage sludge use or disposal, even if this permit has not yet been modified to incorporate the requirement.

M. Duty to Reapply

If the permittee wishes to continue an activity regulated by this permit after the expiration date of this permit, the permittee shall apply for and obtain a new permit. All permittees with a currently effective permit shall submit a new application at least 180 days before the expiration date of the existing permit, unless permission for a later date has been granted by the Board. The Board shall not grant permission for applications to be submitted later than the expiration date of the existing permit.

N. Effect of a Permit

This permit does not convey any property rights in either real or personal property or any exclusive privileges, nor does it authorize any injury to private property or invasion of personal rights, or any infringement of federal, state or local law or regulations.

O. State Law

Nothing in this permit shall be construed to preclude the institution of any legal action under, or relieve the permittee from any responsibilities, liabilities, or penalties established pursuant to any other state law or regulation or under authority preserved by Section 510 of the Clean Water Act. Except as provided in permit conditions on "bypassing" (Part II U), and "upset" (Part II V) nothing in this permit shall be construed to relieve the permittee from civil and criminal penalties for

noncompliance.

P. Oil and Hazardous Substance Liability

Nothing in this permit shall be construed to preclude the institution of any legal action or relieve the permittee from any responsibilities, liabilities, or penalties to which the permittee is or may be subject under Sections 62.1-44.34:14 through 62.1-44.34:23 of the State Water Control Law.

Q. Proper Operation and Maintenance

The permittee shall at all times properly operate and maintain all facilities and systems of treatment and control (and related appurtenances) which are installed or used by the permittee to achieve compliance with the conditions of this permit. Proper operation and maintenance also includes effective plant performance, adequate funding, adequate licensed operator staffing, and adequate laboratory and process controls, including appropriate quality assurance procedures. This provision requires the operation of back-up or auxiliary facilities or similar systems which are installed by the permittee only when the operation is necessary to achieve compliance with the conditions of this permit.

R. Disposal of Solids or Sludges

Solids, sludges or other pollutants removed in the course of treatment or management of pollutants shall be disposed of in a manner so as to prevent any pollutant from such materials from entering state waters.

S. Duty to Mitigate

The permittee shall take all reasonable steps to minimize or prevent any discharge or sludge use or disposal in violation of this permit which has a reasonable likelihood of adversely affecting human health or the environment.

T. Need to Halt or Reduce Activity Not a Defense

It shall not be a defense for a permittee in an enforcement action that it would have been necessary to halt or reduce the permitted activity in order to maintain compliance with the conditions of this permit.

U. Bypass

 "Bypass" means the intentional diversion of waste streams from any portion of a treatment facility. The permittee may allow any bypass to occur which does not cause effluent limits to be exceeded, but only if it also is for essential maintenance to assure efficient operation. These bypasses are not subject to the provisions of Parts II U 2 and U 3.

2. Notice

- a. Anticipated bypass. If the permittee knows in advance of the need for a bypass, prior notice shall be submitted, if possible at least ten days before the date of the bypass.
- b. Unanticipated bypass. The permittee shall submit notice of an unanticipated bypass as required in Part II I.

Prohibition of bypass.

- a. Bypass is prohibited, and the Board may take enforcement action against a permittee for bypass, unless:
 - (1) Bypass was unavoidable to prevent loss of life, personal injury, or severe property damage;
 - (2) There were no feasible alternatives to the bypass, such as the use of auxiliary treatment facilities, retention of untreated wastes, or maintenance during normal periods of equipment downtime. This condition is not satisfied if adequate back-up equipment should have been installed in the exercise of reasonable engineering judgment to

Permit No. VA0004669 Part II Page 7 of 8

prevent a bypass which occurred during normal periods of equipment downtime or preventive maintenance; and

- (3) The permittee submitted notices as required under Part II U 2.
- b. The Board may approve an anticipated bypass, after considering its adverse effects, if the Board determines that it will meet the three conditions listed above in Part II U 3 a.

V. Upset

- An upset constitutes an affirmative defense to an action brought for noncompliance with technology based permit effluent limits if the requirements of Part II V 2 are met. A determination made during administrative review of claims that noncompliance was caused by upset, and before an action for noncompliance, is not a final administrative action subject to judicial review.
- 2. A permittee who wishes to establish the affirmative defense of upset shall demonstrate, through properly signed, contemporaneous operating logs, or other relevant evidence that:
 - a. An upset occurred and that the permittee can identify the cause(s) of the upset;
 - b. The permitted facility was at the time being properly operated; and
 - c. The permittee submitted notice of the upset as required in Part II I 2.
 - The permittee complied with any remedial measures required under Part II S.
- 3. In any enforcement proceeding the permittee seeking to establish the occurrence of an upset has the burden of proof.

W. Inspection and Entry

The permittee shall allow the Director, or an authorized representative, upon presentation of credentials and other documents as may be required by law, to:

- 1. Enter upon the permittee's premises where a regulated facility or activity is located or conducted, or where records must be kept under the conditions of this permit;
- Have access to and copy, at reasonable times, any records that must be kept under the conditions of this permit;
- 3. Inspect at reasonable times any facilities, equipment (including monitoring and control equipment), practices, or operations regulated or required under this permit; and
- 4. Sample or monitor at reasonable times, for the purposes of assuring permit compliance or as otherwise authorized by the Clean Water Act and the State Water Control Law, any substances or parameters at any location.

For purposes of this section, the time for inspection shall be deemed reasonable during regular business hours, and whenever the facility is discharging. Nothing contained herein shall make an inspection time unreasonable during an emergency.

X. Permit Actions

Permits may be modified, revoked and reissued, or terminated for cause. The filing of a request by the permittee for a permit modification, revocation and reissuance, or termination, or a notification of planned changes or anticipated noncompliance does not stay any permit condition.

Y. <u>Transfer of Permits</u>

Permits are not transferable to any person except after notice to the Department. Except
as provided in Part II Y 2, a permit may be transferred by the permittee to a new owner or
operator only if the permit has been modified or revoked and reissued, or a minor

Permit No. VA0004669 Part II Page 8 of 8

modification made, to identify the new permittee and incorporate such other requirements as may be necessary under the State Water Control Law and the Clean Water Act.

- 2. As an alternative to transfers under Part II Y 1, this permit may be automatically transferred to a new permittee if:
 - a. The current permittee notifies the Department at least 30 days in advance of the proposed transfer of the title to the facility or property;
 - b. The notice includes a written agreement between the existing and new permittees containing a specific date for transfer of permit responsibility, coverage, and liability between them; and
 - c. The Board does not notify the existing permittee and the proposed new permittee of its intent to modify or revoke and reissue the permit. If this notice is not received, the transfer is effective on the date specified in the agreement mentioned in Part II Y 2 b.

Z. Severability

The provisions of this permit are severable, and if any provision of this permit or the application of any provision of this permit to any circumstance, is held invalid, the application of such provision to other circumstances, and the remainder of this permit, shall not be affected thereby.